

The Effects of Indigenous knowledge on an adult's Livelihood: A case of Ten Selected Villages of Kilwa Island in Nchelenge District of Luapula Province

Lufeyo Chitondo

Rockview University, Lusaka, Zambia

Abstract: The aim of the study was to investigate the effects of indigenous knowledge on an adult's livelihood in selected ten villages of Kilwa island in Nchelenge district of Zambia. The study employed a mixed paradigm and descriptive survey design that sampled ten villages and villagers. One hundred and ten (110) respondents participated in the study. Respondents consisted of ten Village Head persons (10) and one hundred (100) villagers. Data was obtained from respondents by means of questionnaires, interviews and focus group discussions. Frequency, percentages, tables, charts and graphs were used to analyse the qualitative and quantitative data obtained. The study reviewed that indigenous knowledge passed on skills and knowledge to learners in different subject areas, enabled recipients of such knowledge to survive in life. In addition, it was mainly concerned with practical activities and also, it developed a sense of loyalty and pride in membership of a tribe.

Key words: knowledge, indigenous, learner, loyalty, pride.

1. INTRODUCTION

Indigenous knowledge could be termed as the means whereby one generation of the African adults, especially those living in rural communities transmits the wisdom and experience which prepares the next generation for life's duties and pleasures. Usually, indigenous knowledge is communicated or passed on through oral traditions using an experience-based relationship with the family, animals, spirits and the land. In addition, indigenous knowledge is a system which comprises knowledge developed within indigenous societies and is independent of modern knowledge and was in place prior to the advent of the modern scientific knowledge system. Also, indigenous knowledge could be termed as African traditional education which was based on African philosophy of education which emphasized learning by doing, respect for elders, life-long education, training on the job, learning to live and living to learn. Oduaran, (2002).

African traditional education focused on the training and skill development of the individuals in various local communities and it enabled every member of each community to be gainfully employed as it had its foundation in the five principles of preparation, functionalism, communalism, perennialism and holism, Bray and Stephens, (1986). Above all, indigenous knowledge specifically focuses on teaching indigenous knowledge, models, methods and content within formal or non-formal educational systems. In addition, the principal aim of the African education in the indigenous societies was to prepare an individual for life, for self-reliance as education was for living and was meant to train the youth for adulthood within the community.

The primary purpose of traditional education is to transmit to a next generation those skills, facts and standards of moral and social conduct that adults consider to be necessary for the next generation's material. More so, goals of indigenous education is multilateral and the end objective is to produce an individual who is honest, respectable, skilled, co-operative and conforms to the social order of the day. The indigenous learning styles often includes observation, imitation, use of narratives or story-telling, collaboration and co-operation, Sibalwa (2013). Moreover, this is hands on approach that emphasizes direct experience and learning through inclusion.

The characteristics of indigenous education were strong link to territories and surrounding natural resources; direct social, economic or political systems; distinct language, culture and beliefs; form non-distinct groups of society and resolve to maintain and reproduce their ancestral environments and systems as distinct people and communities. Indigenous education was important because indigenous knowledge is the basis for local level decision-making in food security, human and animal health, education and other vital economic and social activities, Oduaran, (2002).

1.1 Statement of the problem

Indigenous education is survivalistic education that teaches individuals to adapt to the environment by finding out means of surviving on their own void of others. It is clear in Africa and Zambia in particular today that there is no any other form of education taught for the survival of the children as it were in the indigenous African education, Fafunwa, (1974).

1.2 Purpose of the study

The purpose of the study was to investigate the effects of indigenous knowledge on an adult's livelihood in selected ten villages of Kilwa island in Nchelenge district of Zambia.

1.3 Research objectives

1. To determine the effects of indigenous knowledge on an adult's livelihood in the ten selected villages of Kilwa island in Nchelenge district.
2. To assess the suitability and effectiveness of indigenous learning styles employed in the ten selected villages of Kilwa island in Nchelenge district.
3. To identify strategies that can be put in place to enhance survivalistic education in the ten selected villages of Kilwa island in Nchelenge district.

1.4 Theoretical Framework

The study was guided by the Social constructivist theory by Vygotsky (1978) which uses the Zone of proximal development (ZPD) and according to Vygotsky, learning occurs in zones where ZPD is the distance between a student's ability to perform a task under adult guidance with peer collaboration and the student's ability in solving the problem independently. Vygotsky's theory promotes learning contexts in which learners play an active role in learning whereas the teacher plays a collaborative role in order to help facilitate meaningful construction in learners and therefore, learning becomes a reciprocal experience. Scaffolding instruction as a teaching strategy originates from this theory and the strategy provides individualized support based on the learner's ZPD (Don 2017).

1.5 Significance of the study

It is hoped that the findings of the study would be of help to all the stake holders interested in education in Zambia. It would benefit the Ministry of Education in continuously reviewing the programmes so as to come up with appropriate interventions as well incorporate indigenous knowledge in the school curriculum to help school going children acquire survival skills at an early age not only in Nchelenge schools but in all Zambian basic schools. The policy makers would benefit as the study would help them modify the education system to

make it more relevant to national needs. The findings would also help school administrators to create local policies on the teaching of survival skills.

2. LITERATURE REVIEW

2.1 Indigenous knowledge

Indigenous knowledge could be termed as the means whereby one generation of the African adults, especially those living in rural communities transmits the wisdom and experience which prepares the next generation for life's duties and pleasures. Usually, indigenous knowledge is communicated or passed on through oral traditions using an experience-based relationship with the family, animals, spirits and the land.

Indigenous knowledge is a form of education in its own right as Snelson, 1974:1 defines education as, "a condition of human survival". As Snelson alludes to above, indigenous knowledge passed on skills and knowledge to learners in different subject areas which enabled recipients of such knowledge to survive in life. However, indigenous knowledge could also be termed as traditional education but the form of this traditional education varied from one tribal society to another, depending on the environment and custom although many elements were common in all the tribes.

The African adults, especially, were the instructors as they were the ones who possessed this knowledge and boys learned separately from the girls and learning was by observation, imitation and repetition. Above all, this type of education was concrete and verbal, was concerned with practical activity and not abstract generalization. For example, the young boy would accompany his father or uncle on hunting expeditions into the bush and there, he learned the names and uses of many herbs, fruits, shrubs and trees. Also, he was shown how to find his way, how to read the wind, how to set traps, to follow the spoor of the game, to shoot a straight arrow, how to skin and dismember an animal. If for instance, the boy lived in a cattle area, he was taught how to herd the cattle, care for those which were sick or injured and how to defend them against attack. Those near rivers were taught the art of fishing, making canoes, nets and fish traps while those near forests were taught how to chop tress, make ropes, drums and baskets.

Girls, on the other hand, spent much of their time with their mothers, aunts and grandmothers, and from an early age began to learn those skills which would be required of them as wives and mothers of the future (Snelson, 1974:2). For example, the girl learned the art of sweeping the hut, washing pots and calabashes, cooking, child mending, how to make pottery, brew beer and how to weed the garden. She also learned by constant practice a wide range of agricultural tasks such the planting of seeds, harvesting and storage of the crops.

The instructions, which were largely conducted by the elders, developed a sense of loyalty and pride in membership of the tribe. Stories were told around the fire in the evening, repeated by youngsters among themselves and this ensured the continuity of the language. For example, among the Bemba speaking tribes, men gathered at a place called 'insaka' while females's gathering place was called "ichibwanse". Often, elders expressed themselves through metaphors, proverbs, parables, riddles and puzzles that had many levels of meaning. For instance, if a parent saw that nshima at the communal meeting place was not enough for the child, he would go home, put nshima and relish in a bundle of fibre and ask the young boy to go and soak the bundle of fibre in a river. A clever boy would open the bundle and consume the contents but the foolish one would go straight to the river, soak fibre in water and bring it back without opening it.

Social obligations and the inculcation of good manners, usually taught by the parents or close relatives was another element in a young man's or woman's acquisition of indigenous knowledge. Social obligations and inculcations of good manners were taught to both boys and girls from a very early age. For example, children learning the correct modes of greeting and addressing other members of the tribe especially elders, how to sit, how to receive or give a present. The young were taught to respect the old, to extend hospitality even to strangers and to contribute skills and labour at a community project.

On indigenous knowledge, Sibalwa, 2013:25 says, "African adults also tend to store indigenous knowledge in their memories and activities". As Sibalwa alludes to, religious teaching was another area in which the young had to receive knowledge. Religious knowledge centred around and on the Supreme Being, Mulungu (God) or 'Lesa' who is a remote but all pervading creator and also, on the intimate tribal gods who controlled the tribe's fortunes. For example, young people had to learn of the influence of bad or good spirits who brought bad omen or intervened in people's daily living. In the African societies, every event was punctuated by religious experience. For instance, the births of twins, sickness, draught, death of a dog were accorded spiritual significance. The young learned how to propitiate spirits of the departed, when to perform purification ceremonies, values of certain charms and protective medicines.

The initiation ceremony was a significant event with concentrated course of instruction given to each age group on reaching puberty. The transition from childhood to manhood or womanhood was at initiation schools which were usually held in secluded corners of the bush and these initiation ceremonies were marked by tests of physical endurance, instructions in traditional hygiene and sexual behavior and the responsibilities as well as the rights of married life. In some tribes, the ceremony includes the act of circumcision for both boys and girls. On traditional hygiene and sexual behavior for example, girls were taught how to use pads during menstruation, how to handle man's manhood during sexual intercourse and also, how to clean it after intercourse.

Indigenous knowledge was used by African adults to impart what could be termed as specialized training and this was given appropriately to the aptitude and abilities of the young people and also according to the manpower needs of a given community (Mwansa, 2007:10). For example, the strongest and fittest young men learned the business of warfare and defended tribal lands and possessions. Some learned crafts such as blacksmith and forged weapons, made hoes, axes and other tools while others trained in the special skills of divining, or healing, or drumming or rain making. Women on the other hand, learned the skills and responsibilities of housewives, earned reputation as midwives while others came to be renown for the excellence of beer-making, weaving or pottery.

Indigenous knowledge was a good medium for preparing young people for life as it preserved the cultural heritage, language and institutions, taught the young people to make the best use of their physical environment, it fostered obedience, unselfishness, endurance of hardship, encouraged honesty, self-restraint and respect for the rights of others.

2.2 Motivation for learning

Chapman, 1995:474 defines motivation as, "the reason for action or to act in a particular way." As Chapman alludes to above, motivation for learning therefore, is what propels or compels people, in this case, adults to participate in any learning programme. Adult education is a process whereby persons who no longer attend school on a regular and full- time basis are provided with the type of education which is designed for adults under sequential and organized activities with the conscious intentions of bringing about changes in information knowledge, understanding or skills appreciation and attitudes for the purpose of identifying and solving personal or community problems.

Adult learners' motivation for learning is grounded in reasons which can be classified as fear-driven, personal, family, communal and functional (Mwansa, 2007:114). As Mwansa alludes to above, one of the reasons to start with, for adults' motivation for learning is fear and insecurity. Men for example, are motivated to learn so as to overcome the feeling of shame and be recognized as people especially when among friends who were literate. On the other hand, women want to overcome a sense of fear and insecurity. For instance, illiterate women feel insecure in their marital relationships in that husbands may opt for a literate woman, fear of spouse infidelity and also fear of deception in matters related to incomes earned by their spouses.

Desire for personal independence and do things for themselves is another significant reason for adults motivation for learning. Adults desire to do things for themselves and not to rely on others motivates them to

learn. For example, adults would like to read letters from their children and relatives as well as write letters to them without assistance or other people knowing the contents of the letter. Adults desire for personal independence is great during an election where they would like to mark on a ballot paper all by themselves and also, sign their own names on the National Registration Cards as well as sign names wherever collecting money from the Post Office or read the prices of commodities in shops when they go shopping.

Reading and writing is an ability which is needed by adults in order for them to function effectively in society. Reading and writing programmes enable adult participants to improve their social and economic status. This entails that such literate adults simplify the levels of understanding in many spheres and could be engaged in many activities which in turn bring about development (Law, 1970:56). An example of this is that literate adults could be engaged as Secretary to the Village Headperson, secretary of a village project committee or even as co-ordinator for a Non-Governmental Organisation giving assistance to orphans and vulnerable children. This brings about recognition and respect to such a literate adult.

Adult learners need materials which are at their level of understanding. On the same, Law, 1970:45 says, "giving adults challenging work automatically dampens their morale and also, lessons should be in the adult's area of interest" As Law writes, this is so because adults go to school to learn things that they admire to do in their lives or those that are essential in their lives. For example, adults at Katena Literacy Class in Milenge district of Luapula Province are peasant farmers who attend classes so as to learn the skills of proper soils for maize cultivation, applying fertilizers to their crops and those who own vegetable fields learn how to apply right quantities of insecticide to their vegetables as well as know the period when to access vegetables after application of insecticide. These are activities which the adults in this class are engaged in and also, materials given to them are at their level of understanding and this is what motivates them to learn.

Adults may want to learn in order to advance their careers, to earn more money or to meet external expectations. These reasons motivate adult learners to participate in learning. For example, in the Ministry of Education which is a restructured Ministry entry into certain positions requires attainment of given qualifications and this external expectation compel adult teachers in the Ministry to enroll in various programmes so as to meet this requirement. Another example would be that of earning more money. In the Public Service, there is qualification audit and workers are now paid according to qualification one has attained. For example, a class teacher who is a degree holder gets more money than a Headteacher who is a diploma holder. This therefore, compels people with lower qualifications to enroll in programmes in order to earn more money.

Adults are motivated to learn if the programme to be undertaken will help them gain knowledge or skills to function better. On the same, Mwansa confirms this when he says that, "adults go to learning situations to gain knowledge or skills which they can use in order to function better in their different roles" (Mwansa, 2006:29). As Mwansa alludes to, a good example of this is what happens at Katena Literacy Class where adult learners go to gain knowledge and skills. For example, emphasis in this class is on teaching reading and writing, agricultural skills and Primary health care. Here, adults learn different skills related to handling a plough, identifying and planting good seed, applying right quantities of fertilizers and health skills such as care for children, home management and environmental protection and these lessons, help these adults to gain knowledge and skills which enables them to function better in society.

It should also be noted that adults' motivation for learning comes from programmes that are learner centered and on the same, Sibalwa, 2013: 19 brings out this when he says "adults are motivated to learn when learning is stimulated, learner – centred and needs oriented". As alluded to above, learning for adults should be stimulating and class discussions at Katena Literacy Class for example, are learner – provoked as well as learner – centred and lessons are relevant and relate to the lives of the adult learners or the culture and the environment in which the learners are found.

Adult motivation for learning varies and they learn to achieve specific goals and some participate for the sake of social contact in order to avoid isolation while others just enjoy the pursuit of knowledge for its own sake. Also, adults tend to continue with a learning experience or programme until their needs are fully satisfied.

2.3 Previous experience

Sibala, 2013: 24 says, “ In many African societies experience is regarded as being more important than knowledge”. Sibalwa further talks of many African adults equating experience with age and it should also be noted that from the African point of view, learning always begins with experience. In many African societies, adults are deemed to possess a wealth of experience and this experience is gained throughout their lives, which also forms a sound foundation for learning. On this basis therefore, the adults who had previous experience were the instructors in traditional education. Instructions were through the use of myths, legends and metaphors which were also used by the African adults to make sense of their world and as a means of understanding incomprehensible problems. For example, in the Bemba tradition, when teaching girls and boys to refrain from indulging in pre-marital sex, adults used metaphors of a snake and a brazier. To the girls, they would tell her that boys had a snake in their trousers which bites while to the boy, they would say that girls had a brazier in skirts which burns boys. These teaching deterred boys and girls from indulging in pre-marital sex for fear of being bitten or burnt thus preserving their virginities.

Adults, continually came to know more about life by making connections between the past, the present and the future (Sibalwa, 2013: 24). Using the past experience, the African adults impart knowledge to others which they derive from experimentation or observation and also, adults use experience to explain or predict natural phenomena. For example, the fishermen of Nchelenge in Luapula Province who have lived their whole lives fishing know and are able to read the weather. They are able to tell when the lake would be rough or calm and warn people not to dare go on the lake. They are able also, to tell the movement of fish, places and times when fish could be caught. Above all, due to experience, they are acquainted with the movements of the sun, the moon and stars and the effects these have on weather and what natural phenomena their movements can cause to humanity.

African adults tend to store knowledge in their memories and activities and they use stories, proverbs, songs, folklore, dances and myths to tell others about their experience. For example, when instructing a young girl on good behavior towards the husband, an elderly woman would start a song such as “umulumbe akwite wati foko, ifwe tutila kwai kwai kwai” (when a husband calls you, you should answer politely) while frog jumping in a circle. This song simply means, when a husband calls, you should not answer rudely but with humility or politely and with respect while kneeling down before him. In other words, the adult in a song tells the young lady to be submissive because in African societies, men generally expect women to conform, to serve and to please them. However, songs were widely used to teach the young and adults alike on a number of issues.

Adults in African societies possess more procedural knowledge than children and usually, adults know what is important to them and why it is important. For example, on sex education, there were obligation men and women had to each other and also, certain dos and don'ts for married couples. An example would be that of a pregnant woman not allowed to eat eggs because she would give birth to a child without hair. This taboo was to discourage pregnant women from eating eggs due to their nutritious contents which usually enabled a child to grow bigger and at times out of proportion, therefore causing complications during delivery and because in the olden days medical facilities were either not available or scarce. So, this prevented deaths during child birth which was important to expecting mothers and the adults.

In many African societies and to all African adults, knowledge is a ‘seed’. This is so because a seed can be got from one who has it, stored and when one cultivates, plants the seed, it multiplies. One seed would bring out many crops during harvesting time. In the same vein, if the past experience one adult has is passed on to another, it would eventually reach many people and in the end, the whole family, clan or community would benefit from a single adult's past experience.

In many African societies, experience is regarded as more important than knowledge and learning always begins with experience. African people, especially adults have different methods of imparting knowledge which is derived from experimentation and observation.

In conclusion, as already alluded to above, indigenous knowledge was a good medium for preparing young people for life as it preserved the cultural heritage, language and institutions. Adult learners' motivation for learning is grounded in reasons which are classified as fear-driven, personal, family, communal and functional while past experience is regarded as more important than knowledge in many African societies and that learning always begins with experience.

3. METHODOLOGY

3.1 Study Design

The study adopted a mixed methods approach which is a combination of quantitative and qualitative data. Exploratory and descriptive designs were as well considered appropriate as they also allowed for more flexible strategies of data collection in order to answer the research questions, (Best and Kahn, 2006). The research design was a descriptive survey, as Borg and Gall, (1989) pointed out that a descriptive study may often result in the formation of important principles of knowledge and solutions to significant problems. The study incorporated both qualitative and quantitative aspects of research. It was aimed at collecting information from respondents on the effects of indigenous knowledge on an adult's livelihood in the ten selected villages of Kilwa island. It highlighted the aims, characteristics and the suitability and effectiveness of teaching styles of indigenous education, motivation for learning, previous experience and strategies to enhance survivalistic aspects. Structured open-ended interviews were used to respondents. The internet also supplemented data for the study.

3.2 Research sites

The study was carried out in the ten selected villages (Nshimba, Lukwesa, Katufi, Chisukulu, Kamuchanga, Fyombwe, Bwaya, Kapopolo, Chinsamba and Kabeke) on Kilwa island in Nchelenge district of Luapula Province from which respondents were also sampled.

3.3 Population, Sample and Sampling procedure

The population for the study was purposefully drawn from the ten villages, Awokeni (2006). Purposive sampling procedure was used to select Village Head persons (10) while the simple random sampling procedure was used to select the villagers (100-ten from each selected village). The sample size comprised of 110 respondents. Also, the primary data was complimented by the secondary data which was derived from government policy documents, ministerial reports and relevant literature on African traditional education, Ngandu (2013).

In the sampling of institutions, the study adopted the stratified cluster random sampling technique, Donald (2003). Sampling was done zone by zone. Villages were clustered by zones. One zone was purposively selected based on highest number of villages. The sampling was done at three levels: Sampling zones and villages- level 1, Sampling Village Head persons-level 2 and Sampling villagers-level 3.

3.4 Data Analysis

In this research, data was analysed qualitatively as the semi structured interviews and observation schedules were used as data collection instruments. Thematic approach was used, where data analysis started with the categorization of themes from the semi structured interviews and observation schedules Kombo and Tromp (2006). Charts and graphs were used to analyse data. The data gathered was analysed according to the themes of the study, the order of the research objectives. Data generated from the interview guide was analysed manually and also, a combination of software MS Access, SPSS and MS Excel was used to analyse data. Analysis was mainly descriptive, that is, mean, median, mode, range, and standard deviation. Related statistics were

applied where possible. Statistical testing took the form of Analysis of Variance (ANOVA), correlation and regression both simple and multiple.

3.5 Ethical Issues

The researcher avoided pressuring respondents to take part in the research. Alternatively, permission consents, assents were obtained from respondents involved in the research and the research topic was strategically selected to ensure that there was no harm whatsoever to the research respondents. In this research, the researcher was fully conscious of the need to abide by the ethical rule of respecting the privacy of individuals taking part in the research. In the same way, all the respondents of the research were to remain unidentified to the public as all their valuable views, opinions and perceptions were only known by the researcher for use only in the research and participant's identities will forever remain hidden.

The Researcher got permission from the local Chief to interview Village Headpersons and Villagers in the ten villages. The names of respondents would remain anonymous for the sake of confidentiality, Bryman (2001) and Diener and Crandall (2008). However, the identity of respondents was concealed in the thesis but for identification in the thesis, the one hundred villagers were allocated numbers 1 to 100 while the ten Village Headpersons were allocated letters of the alphabet A to J.

4. FINDINGS AND DISCUSSIONS

4.1 Effects of indigenous knowledge on adult livelihood

According to study results, indigenous knowledge has effects on the lives of individuals in adulthood in any given community and these were: self- reliance (90%), personal survival (90.91%) and self-employment (93.64%) while honesty was at (87.28%). Study results also indicated that 83.64% of the respondents said that it helps to cultivate the virtue of respecting others.

Data also showed that there was an association between indigenous knowledge and an individual's life styles in the community. According to data obtained, 90.91% of the adults were skilled and were co-operative (91.82%), were able to conform to daily social order (86.37%) while being an eclectic person was at 85.46% as shown in Table 1 below.

Table 1: Effects of indigenous education

Effects of indigenous education	Actual	Percentage	
		Yes	No
Self reliance	11	90	10
Personal survival	10	90.91	9.09
Self-employment	7	93.64	6.36
Honesty	14	87.28	12.72
Respectable	18	83.64	16.36
Skilled	10	90.91	9.09
Co-operative	9	91.82	8.18
Conform to daily social order	15	86.37	13.63
Eclectic person	16	85.46	14.54

Indigenous knowledge had an effect on African child because the adults, especially who were familiar to the child were the instructors as they were the ones who possessed this knowledge and boys learned separately from the girls and learning was by observation, imitation and repetition. Above all, this type of education was concrete as well as verbal, was concerned with practical activity and not abstract generalization (Snelson,

1974). The boys for example, learned only things that were to help them survive in adulthood such as hunting where the young boy would accompany his father or uncle on hunting expeditions into the bush and there, he learned the names and uses of many herbs, fruits, shrubs and trees. Also, he was shown how to find his way, how to read the wind, how to set traps, to follow the spoor of the game, to shoot a straight arrow, how to skin and dismember an animal. If for instance, the boy lived in a cattle area, he was taught how to herd the cattle, care for those which were sick or injured and how to defend them against attack. Those near rivers were taught the art of fishing, making canoes, nets and fish traps while those near forests were taught how to chop tress, make ropes, drums and baskets.

Data also showed that there was an association between indigenous knowledge and an individual's life styles in the community, Bray and Stephens (1986). This was due to the fact that adults were skilled and were co-operative and were able to conform to daily social order thereby making one be an eclectic person. Indigenous knowledge was a good medium for preparing young people for life as it preserved the cultural heritage, language and institutions, taught the young people to make the best use of their physical environment, it fostered obedience, unselfishness, endurance of hardship, encouraged honesty, self-restraint and respect for the rights of others, Mwansa, (2007). In addition, indigenous knowledge enabled community members to function positively in adult life as the knowledge acquired enabled them to survive in difficult situations, were self-reliant as they were able to perform most of the tasks on their own and could go about looking for employment, Kelly, (1998). In adult life, they were honesty, respected others, were skilled in tasks they worked on and above all, they were able to conform to daily social order.

4.2 Suitability and effectiveness of indigenous learning styles

The common learning styles used were observation, imitation, narratives or story-telling, collaboration and co-operation and the study revealed that 15 respondents (13.63%) said that observation style was not suitable, 30 (72.73%) said imitation style was suitable, 10 (9.09%) said the narrative or story telling style was not suitable, 25 (77.28%) said that the collaboration style was suitable while 20 (81.82%) said that the co-operation style of learning was suitable. On the effectiveness of the learning styles, the study revealed that the most effective learning styles were observation with 20 respondents (81.82%) affirming and imitation with 35 (68.19%) while 20 (16.36%) said narratives or story- telling were not effective, 15 (13.63%) said collaboration was ineffective and 12 (10.90%) said co-operation as a teaching style was no effective in modern days and the data given in Table 2 below reveals this information.

The study reviewed that the common learning styles used were observation, imitation, narratives or story-telling, collaboration and co-operation and these styles helped with the inculcation of survival skills to the learners which enabled them not to be dependent on others in adulthood. During the imitation style of learning, the learners copied what the adult teachers did such as basket making, household chores and other practical activities and continued with the same in adulthood thus making them self-reliant, Law (1970). The other teaching style was narrative or story telling style was not suitable as very few learners were able to imitate what the teacher did or said that while the collaboration and co-operation styles of learning enabled learners to become responsible citizens of a given social group.

On the whole, the teaching styles were effective in that they enabled the learner in adulthood to make sense of their world and as a means of understanding incomprehensive problems Bray and Stephens, (1986). In other words, the graduate of indigenous education was able to be self-dependent as well as self-reliant. In addition, the person, who underwent such type of education was also able to teach others in adult life. In addition, indigenous knowledge passed on skills and knowledge to learners in different subject areas, enabled recipients of such knowledge to survive in life. In addition, it was mainly concerned with practical activities and also, it developed a sense of loyalty and pride in membership of a tribe.

Table 2: Suitability and effectiveness of teaching styles

S/N	Learning style	Actual	Suitability	Not suitable	Actual	Effectiveness	Ineffectiveness
1.	Observation	110	13.63%	86.37%	110	81.82%	18.18%
2.	Imitation	110	72.73%	27.27%	110	68.19%	31.81%
3.	Narratives	110	9.09%	90.91%	110	16.36%	83.64%
4.	Collaborate	110	77.28%	22.72%	110	13.63%	86.37%
5.	Cooperate	110	81.82%	18.18%	110	10.90%	89.1%

4.3 Strategies to enhance survivalistic education

Study results showed that a number of strategies if put in place would enhance survivalistic indigenous education not only in the ten selected villages of Kilwa island in Nchelenge district but the country as a whole. The number of respondents and percentage ratios of strategies to enhance survivalistic education were constant practice learned skills; 18 (83.64%), introduction of community projects; 16 with a ratio of 85.46% , intensification of skills training were 15 (86.37%) introduction of village meeting places for both males and females were 14 (87.28%), intensifying initiation ceremonies for both sexes were 11 (90%), use of a variety of teaching styles and social obligations were 10 (90.91%) each, inculcation of good manners were 9 (91.82%) while motivating adults to learn was the least with 7 (93.64%) as illustrated in Table 3 below.

The study also revealed that in many African societies and to all African adults, knowledge is a 'seed'. This is so because a seed can be got from one who has it, stored and when one cultivates, plants the seed, it multiplies. One seed would bring out many crops during harvesting time. In the same vein, if the past experience one adult has is passed on to another, it would eventually reach many people and in the end, the whole family, clan or community would benefit from a single adult's past experience. This entails that the strategies put in place were able to bring about survivalistic skills in adulthood and the passing on of knowledge was from one generation to another.

Table 3: Strategies to enhance survivalistic education

Strategies to enhance survivalistic education	Actual	Percentage
Use of a variety of learning styles	10	90.91
Introduction of village meeting places	14	87.28
Constantant inculcation of good manners	9	91.87
Teaching social obligations	10	90.91
Intensify working on community projects	16	85.46
Intensify initiation ceremonies	11	90
Enhance skills training	15	86.37
Motivate adults to learn	7	93.64
Constant practice of learned skills	18	83.64

The findings brought out a number of strategies which if put in place would enhance survivalistic indigenous education not only in the ten selected villages of Kilwa island in Nchelenge district but the country as a whole. The learners were to constantly practice learned skills as the old adage says, 'practice makes perfect' and this would only be enhanced through involvement in community projects. The type of education being practiced

at primary and tertiary levels is more theoretical and graduates seek white colour jobs after completion of school but there is need for intensification of skills training were by the introduction of village meeting places for both males and females and adult teachers to use of a variety of teaching styles to teach social obligations as well as inculcate good manners in learners to enable them become responsible citizens, Kelly (1998).

5. CONCLUSION

The conclusion drawn were that indigenous knowledge plays an important role in promoting citizen involvement in all aspects of development in society as citizens who are equipped with indigenous knowledge will be able to participate effectively in the affairs of their communities and the nation at large. Indigenous knowledge, deals with all aspects of human life and environment and therefore, helps the citizens to make choices as well as become self-reliant in adulthood. Survivalistic education should be taught realistically for it to address the central facts about individuals' social obligation, survival in difficulty situations, political as well as governance processes. It is also a tool in the promotion of survival skills teaching in developing nations. Without survivalistic education, it is difficult to implement the traits of development. All stake holders involved in teaching survivalistic education at all levels should be practical and promote citizen involvement at local and central government levels as well as promote the development of survival skills by fostering recognition of survivalistic education in public and private institutions and encouraging adherence to the values and principles of practical or survivalistic education.

6. RECOMMENDATIONS

The following are actions that should be taken on the basis of the findings of this study:

- The Ministry of Education should make sure that sustained and systematic attention is given to survivalistic education in the Zambian curriculum
- Headteachers should ensure that pupils participate or take part in survivalistic education in all the schools as well engaging learners in service and projects- based learning.
- Civic society organization engaged in education should be active in the promotion of survivalistic education in communities in rural areas as well as adopt informal methods of orienting citizens on the aspects of survivalistic education.
- The government and other stake holders to use massive civic enlightenment on survivalistic education through the media, adult education programme and civil associations.
- The Government through the Ministry of Education should put in place a number of strategies that would enhance survivalistic indigenous education.

7. References

1. Blackemore and Cooksey, (1980). A sociology of Education for Africa, London: Allen and Urwin Publishers.
2. Bray, M. and Stephens, (1986). Education and Society in Africa. London: Edward Arnold
3. Chapman, R.L. (1995). Rodget A to Z Thesaurus. New York: Harper Collins Publishers, Inc.
4. Holowinsky, I.Z. and Shimahara, N.K. (2016).(eds.). Teacher Education in Industrialized Nations: Issues in Changing Social Context.London; Routledge.
5. IDEA (2011) Zambia's state of democracy assessment: lessons for others.[www.idea.int/sod/Zambia's state of democracy](http://www.idea.int/sod/Zambia's%20state%20of%20democracy)
6. Kaumba .C. (2015) An examination of student's perceptions of public participation in national governance: a case of university of Zambia.
7. Kelly, M.J. (1998). Origins and development of schools in Zambia. Lusaka: Image Publishers Limited.
8. Kothari. C. R. (2004). Research Methodology: Methods and Techniques. New Delhi:New Age International (p) Limited, Publishers.
9. Law, J. (1970). Adult Education and Nation Building. A Symposium on Adult Education in Developing Countries. Edinburgh: University Press.

10. Letendre, G.K. and Fukuzawa, R.E.(2016). Intense Years: How Japanese Adolescents Balance School, Family and Friends. Tokyo: Routledge.
11. Mwanakatwe, M.J. (1974). The growth of Education in Zambia since Independence, Lusaka: Oxford UNZA Press.
12. Mwansa, D.M. (2006). Readings and Development of Literacy in Zambia. Module No. MED 2. Lusaka: ZAOU Press.
13. Mwansa, D.M. (2007). Community Perspectives on Literacy, Med Literacy Reader. Lusaka: ZAOU Press.
14. Nielssen, H.D., and Cummings, W.K. (1997). Quality Education for All: Community Oriented Approaches. New York: Routledge.
15. Ninnes, P. and Mehta, S. (2017). (eds.). Re-Immerging Comparative Education Postfoundational Ideas and Applications for Critical Times. New York: Routledge.
16. Ocitti, J.P. (1973). African indigenous education. Nairobi: East Africa Literature Bureau.
17. Peters, S.J. (2016). Education and Disability in Cross-Cultural Perspectives. London: Taylor and Francis
18. Sibalwa, D.M. (2013). AED 121 Psychology of Adult Learners. Lusaka; ZAOU Press
19. Snelson, P. (1974). Educational Development in Northern Rhodesia 1883-1945. Lusaka: Kenneth Kaunda Foundation
20. Tjeldvoll, A. (2016). Education and the Scandinavian Welfare State in the Year 2000. Equality, Policy and Reform. Armsterdam: Routledge.
21. Wilson, M. and Erskine, S. (2016). Gender Issues in International Education Beyond Policy and Practice. London: Routledge.

INFO

Corresponding Author: *Lufeyo Chitondo, Rockview University, Lusaka, Zambia.*

How to cite this article: *Lufeyo Chitondo, The Effects of Indigenous knowledge on an adult's Livelihood: A case of Ten Selected Villages of Kilwa Island in Nchelenge District of Luapula Province, Asian. Jour. Social. Scie. Mgmt. Tech. 2021; 3(6): 33-44.*